UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/803,399	03/18/2004	Stephan K. Barsun	82178951	5524

22879 7590 06/18/2012

HEWLETT-PACKARD COMPANY
Intellectual Property Administration
3404 E. Harmony Road
Mail Stop 35
FORT COLLINS, CO 80528

EXAMINER	
PAPE, ZACHARY	
ART UNIT	PAPER NUMBER
2835	

NOTIFICATION DATE	DELIVERY MODE
06/18/2012	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

JERRY.SHORMA@HP.COM
ipa.mail@hp.com
brandon.serwan@hp.com

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE BOARD OF PATENT APPEALS
AND INTERFERENCES

Ex parte STEPHAN K. BARSUN, CHRISTIAN L. BELADY,
ROY M. ZEIGHAMI, and CHRISTOPHER G. MALONE

Appeal 2010-001828
Application 10/803,399
Technology Center 2800

Before LANCE L. BARRY, HOWARD B. BLANKENSHIP, and
JAMES R. HUGHES, *Administrative Patent Judges*.

BARRY, *Administrative Patent Judge*.

DECISION ON APPEAL

STATEMENT OF THE CASE

The Patent Examiner rejected claims 17, 34-37, 39-42, 51, 53, and 54. (Ans. 2.) The Appellants appeal therefrom under 35 U.S.C. § 134(a). We have jurisdiction under 35 U.S.C. § 6(b).

INVENTION

The following claims illustrate the invention on appeal.

34. A processor module comprising:
a processor configured to be connected to a circuit board, the processor having a first heat transfer surface;
a power pod electrically connected to the processor to supply power to the processor, the power pod having a second heat transfer surface;
a first heat sink overlapping the power pod and thermally coupled to the second heat transfer surface; and
a second heat sink thermally coupled to the first heat transfer surface, wherein the second heat sink extends at least partially across and over the first heat sink.

39. A heat dissipating arrangement comprising:
a first heat emitting device;
a second heat emitting device; and
a first heat sink having fins thermally coupled to the first device, wherein the fins of the first heat sink overlap and extend opposite to opposite sides of the second device.

REJECTIONS

Claim 17 stands rejected under 35 U.S.C. § 112, ¶ 2, as being indefinite for failing to particularly point out and distinctly claim the subject matter which the Appellants regard as the invention.

Claims 34-37, 39, 40, 51, 53, and 54 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over the Appellants' Admitted Prior Art ("AAPA") and U.S. Patent 6,356,448 B1 ("DiBene").

Claims 41 and 42 stand rejected under 35 U.S.C. § 102(b) as being anticipated by DiBene.

Claims 39 and 40 stand rejected under 35 U.S.C. § 102(b) as being anticipated by U.S. Patent No. 5,396,403 ("Patel").

CLAIM 17

The issue before us follows: did the Examiner err in concluding that claim 17 is indefinite for reciting "the fourth device."

A claim is indefinite "where the language 'said lever' appears in a dependent claim where no such 'lever' has been previously recited in a parent claim to that dependent claim." *Ex parte Moelands*, 3 USPQ2d 1474, 1476 (BPAI 1987).

Here, the Examiner rejected claim 17 under 35 U.S.C. § 112, ¶ 2, as being indefinite because "the fourth device" lacks antecedent basis. (Ans. 3.) The "Appellants acknowledge the rejection of claim 17 under 35 USC 112, second paragraph and agree to amend claim 17 to address this rejection . . . ." (Reply Br. 1.)

Therefore, we conclude that the Examiner did not err in concluding that claim 17 is indefinite for reciting "the fourth device."

CLAIMS 34-37 AND 51

Based on the Appellants' arguments, we will decide the appeal of the obviousness rejection of claims 34-37 and 51 on the basis of claim 34. *See* 37 C.F.R. § 41.37(c)(1)(vii).

Therefore, the issue before us follows: did the Examiner err in concluding that the combined teachings of AAPA and DiBene would have suggested a first heat sink overlapping a power pod and a second heat sink extending at least partially across and over the first heat sink, as required by representative claim 34.

"The test for obviousness is what the combined teachings of the references would have suggested to one of ordinary skill in the art." *In re*

Young, 927 F.2d 588, 591 (Fed. Cir. 1991) (citing *In re Keller*, 642 F.2d 413, 425 (CCPA 1981)).

Here, the Appellants argue that "[i]n DiBene, it is the heat sink that is coupled to the *processor* (NOT the heat sink coupled to the power pod) that is overlapped by another heat sink." (Reply Br. 3.)

We agree, however, with the Examiner's following findings and conclusions.

> [I]t was never the Examiner's position that DiBene teaches the heat sink/power pod, heat sink/processor relationship as alleged, rather the Examiner simply used the DiBene reference to teach a second heat sink extending over a first heat sink. The relationship between the heat sink/power pod, heat sink/processor is addressed by AAPA. The Examiner asserts that the Appellant[]s are engaging in piecemeal analysis of the references.

(Ans. 12-13 (emphasis removed).)

Therefore, we conclude that the Examiner did not err in finding that the combined teachings of AAPA and DiBene would have suggested the first heat sink overlapping the power pod and the second heat sink extending at least partially across and over the first heat sink, as required by representative claim 34.

CLAIMS 39-42, 53, AND 54

OBVIOUSNESS REJECTION AND ANTICIPATION REJECTION APPLYING DIBENE

Based on the Appellants' arguments, we will decide the appeal of the obviousness rejection of claims 39, 40, and 53 on the basis of claim 39. Based on the Appellants' arguments, we will decide the appeal of the

anticipation rejection of claims 41 and 42 on the basis of claim 41 and the obviousness rejection of claim 54 on the basis of claims 41 and 54.

Therefore, the issue before us follows: did the Examiner err in concluding that the teachings of DiBene would have taught that "fins of [a] first heat sink overlap and *extend opposite to opposite sides* of [a] second device" (emphasis added) as recited in representative claim 39 and similarly recited in representative claim 41 and claim 54.

"It is axiomatic that anticipation of a claim under § 102 can be found only if the prior art reference discloses every element of the claim, and that anticipation is a fact question . . . ." *In re King*, 801 F.2d 1324, 1326 (Fed. Cir. 1986) (citing *Lindemann Maschinenfabrik GMBH v. Am. Hoist & Derrick Co.*, 730 F.2d 1452, 1457 (Fed. Cir. 1984)). The question of obviousness is "based on underlying factual determinations including . . . what th[e] prior art teaches explicitly and inherently." *In re Zurko*, 258 F.3d 1379, 1383 (Fed. Cir. 2001) (citations omitted).

Here, the Examiner reproduces Figure 1 of DiBene and adds labels and explanations that "detail[ ] how the first heat sink fins extend opposite to opposite sides of a second heat emitting device." (Ans. 14-15.)

The Appellants argue that Figure 3 of "the specification illustrates that the heat sink extends 'opposite to opposite sides' *of a heat emitting device* (claim 39) or *of another heat sink*." (Reply Br. 6.) However, the Appellants do not explain what features in Figure 3 show that "the fins of the first heat sink overlap and *extend opposite to opposite sides* of the second device" (emphasis added) as recited in claim 39. (*See* Reply Br. 6-7.) Comparing Figure 1 of DiBene and Figure 3 of the Specification, moreover, persuades us of no error in the Examiner's position.

Therefore, we conclude that the Examiner did not err in concluding that the teachings of DiBene would have taught that "the fins of the first heat sink overlap and *extend opposite to opposite sides* of the second device" (emphasis added) as recited in representative claim 39 and similarly recited in representative claim 41and claim 54.

ANTICIPATION REJECTION OF CLAIMS 39 AND 40

Here, as discussed above, we affirmed the rejection of claims 39-42, 53, and 54 under § 103(a) over AAPA and DiBene. We find it unnecessary to reach a decision about the Examiner's cumulative rejection of claims 39 and 40 under § 102(b). *See* 37 C.F.R. § 41.50(a)(1) ("The affirmance of the rejection of a claim on any of the grounds specified constitutes a general affirmance of the decision of the examiner on that claim . . . .").

DECISION

We affirm the rejection of claim 17 under § 112, ¶ 2.

We affirm the rejection of claim 34 under § 103(a) and that of claims 35-37 and 51, which fall therewith.

We affirm the rejection of claim 39 under § 103(a) and that of claims 40 and 53, which fall therewith.

We affirm the rejection of claim 41 under § 102(b) and that of claim 42, which falls therewith.

We affirm the rejection of claim 54 under § 103(a).

We do not reach the rejection of claims 39 and 40 under § 102(b).

Because we have affirmed at least one ground of rejection with respect to each claim on appeal, the Examiner's decision is affirmed. *See* 37 C.F.R. § 41.50(a)(1).

No time for taking any action connected with this appeal may be extended under 37 C.F.R. § 1.136(a)(1). *See* 37 C.F.R. § 1.136(a)(1)(iv).

AFFIRMED

peb